

the light spectrums of blue light emitted by the blue cells and green light emitted by the green cells is greater than or equal to 0.8 can be obtained when cells in which blue and green phosphors have been arranged are ignited by applying the same power to each cell.

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#### BRIEF EXPLANATION OF THE DRAWINGS

Fig. 1 is a cross-section of a PDP structure common to both of the embodiments in the present invention;

Fig. 2 is a top-view of a structure for a sealing device relating to a first embodiment;

Fig. 3 is a view of an internal structure of the sealing device;

Fig. 4, A to C show the operation of a preliminary heating process and a sealing process using the attachment device;

Fig. 5 is a top-view of a structure for an aging device relating to the first embodiment;

Fig. 6 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 7 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 8 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 9 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 10 is a top-view showing the relative placement of

partitions, sealing glass and air vents on a back plate;

Fig. 11 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 12 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

5 Fig. 13 is a top-view showing a structure for a discharge tube assessing the durability of the phosphor layer;

Fig. 14 is a graph showing the relation between luminous intensity of the phosphors and partial pressure of steam;

Fig. 15 is a graph showing the relation between a y chromaticity value for the phosphors and partial pressure of steam;

Fig. 16 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 17 is a top-view showing the relative placement of partitions, sealing glass and air vents on a back plate;

Fig. 18 is a top-view showing a structure for an aging device relating to the second embodiment;

Fig. 19 is a graph showing the heating temperature dependency of the relative change in luminous intensity when  
20 the blue phosphor whose luminescent characteristics deteriorated during aging is heated;

Fig. 20 is a graph showing the heating temperature dependency of the change in the y chromaticity value when the blue phosphor whose luminescent characteristics deteriorated  
25 during aging is heated;

Fig. 21 shows various drivers and a panel driving circuit

connected to the PDP; and

Fig. 22 shows a structure for a PDP in the related art.

## PREFERRED EMBODIMENTS OF THE PRESENT INVENTION

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### First Embodiment

Fig. 1 is a cross-section showing the essential components of an AC PDP relating to the present embodiment. In the drawing, a part of the display area in the center of the PDP is shown.

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This PDP is constructed from a front plate 10 and a back plate 20. The front plate 10 is formed from a front glass plate 11, on whose inward surface are placed discharge electrodes 12, formed of pairs of scanning electrodes 12a and sustaining electrodes 12b, a dielectric layer 13 and a protective layer 14. The back glass plate 20 is formed from a back glass plate 21, on whose inward surface are placed address electrodes 22 and a visible light reflective layer 23. The front plate 10 and the back plate 20 are arranged in parallel leaving a gap between them, with the discharge electrodes 12 and the address electrodes 22 facing each other. The space between the front plate 10 and the back plate 20 is divided into discharge spaces 30 by constructing partitions 24, which run in uniform parallel lines. A discharge gas is enclosed in these discharge spaces 30.

Additionally, a phosphor layer 25 composed of alternate